

1     **IN THE CLAIMS**

2             Please add new claims 48-64. This listing of claims will replace all prior versions, and  
3     listings, of claims in the subject application:

4  
5     --1. - 30. (Cancelled)

6  
7     31. (Withdrawn)     A method for coating glass for use in a solid state standard, said method  
8     comprising the steps of:

9             applying a layer of a first fluorescent material;

10            applying a layer of a second fluorescent material, said second fluorescent material

11                    being different from said first fluorescent material;; and

12            applying a layer of a third fluorescent material;

13            wherein each said layer is baked between each said application.

14  
15     32. (Withdrawn)     A method according to claim 31, wherein said method is used to coat  
16     optical glass.

17  
18     33. (Withdrawn)     A method according to claim 31, wherein said method is used to coat  
19     optical quartz.

34. (Withdrawn) A method according to claim 31, wherein said layer is selected from a group consisting of BaF<sub>2</sub>, CaF<sub>2</sub>, CsI, KBr, KCl, KRS-5, NaCl, HFO<sub>2</sub>, MgO, Fluroisothiocyanate (FITC), Fluorescene, Rhodamine B, Quinine Sulfate, Bodipy and Green Fluorescent Protein.

35. (Withdrawn) A method according to claim 31, wherein said first fluorescent material is substantially similar to said third fluorescent material.

36. (Withdrawn) A method according to claim 31, wherein said fluorescent material has a known absorption wavelength.

37. (Withdrawn) A method according to claim 31, wherein said baking takes place at approximately at 250 degrees Centigrade.

38. (Withdrawn) A method for coating glass for use in a solid state standard, said method comprising the steps of:

applying a layer of a first absorbent material;

applying a layer of a second absorbent material, said second absorbent material

being different from said first absorbent material;; and

applying a layer of a third absorbent material;

wherein each said layer is baked between each said application.

1 39. (Withdrawn) A method according to claim 38, wherein said method is used to coat  
2 optical glass.

4 40. (Withdrawn) A method according to claim 38, wherein said method is used to coat  
5 optical quartz.

7 41. (Withdrawn) A method according to claim 38, wherein said layer is selected from a  
8 group consisting of AgBr, AgCl, Al<sub>2</sub>O<sub>3</sub>, CdTe, Ge, Si, SiO<sub>2</sub>, TiO<sub>2</sub>, ZnS, and ZnSe.

10 42. (Withdrawn) A method according to claim 38, wherein said first absorbent material is  
11 substantially similar to said third absorbent material.

13 43. (Withdrawn) A method according to claim 38, wherein said absorbent material has a  
14 known absorption wavelength.

16 44. (Withdrawn) A method according to claim 38, wherein said baking takes place at  
17 approximately at 250 degrees Centigrade.

1     45. (Withdrawn)     A method for coating glass for use in a solid state standard, said method  
2     comprising the steps of:

3                     applying a primary layer of  $\text{TiO}_2$ ;

4                     applying one or more layers of  $\text{SiO}_2$ ; and

5                     applying a final layer of  $\text{TiO}_2$ ;

6                     wherein each layer is baked between said applications.

7  
8     46. (Withdrawn)     A method according to claim 45, wherein said method is used to coat  
9     optical glass.

10  
11    46. (Withdrawn)     A method according to claim 45, wherein said method is used to coat  
12    optical quartz.

13  
14    47. (Withdrawn)     A method according to claim 45, wherein said baking takes place at  
15    approximately at 250 degrees Centigrade.

1     48. (New)     A solid state standard comprising:  
2                   glass coated with a material, said material differing in concentration from said  
3                   glass linearly in a 20 standard curve;  
4                   said material having an optical density which can be read in an absorbance  
5                   microplate reader; and  
6                   said material being such that said reader can read a concentration of a sample at  
7                   standard curve points.

8  
9     49. (New)     A solid state standard according to claim 48, wherein said standard comprises  
10                   coated optical quartz.

11  
12    50. (New)     A solid state standard according to claim 48, wherein said material is selected  
13                   from the group consisting of a known fluorescent compound, a known absorbent compound or a  
14                   known spectroscopic compound.

15  
16    51. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
17                   fluorescent spectroscopy.

18  
19    52. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
20                   absorbent spectroscopy.

1     53. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
2     ultra violet spectroscopy.

4     54. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
5     visible spectroscopy.

7     55. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
8     Infra-red spectroscopy.

10    56. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
11    laser spectroscopy.

13    57. (New)     A solid state standard according to claim 48, wherein said standard is for use with  
14    luminescence spectroscopy.

16    58. (New)     A solid state standard according to claim 48, wherein said standard is  
17    manufactured by a method for coating glass comprising the steps of:  
18                 applying a layer of a first absorbent material;  
19                 applying a layer of a second absorbent material, said second absorbent material  
20                 being different from said first absorbent material; and  
21                 applying a layer of a third absorbent material;  
22    wherein each said layer is baked between each said application.

1      59. (New)      A solid state standard according to claim 58, wherein said method is used to coat  
2      optical glass.

4      60. (New)      A solid state standard according to claim 58, wherein said method is used to coat  
5      optical quartz.

7      61. (New)      A solid state standard according to claim 58, wherein said layer is selected from a  
8      group consisting of AgBr, AgCl, Al<sub>2</sub>O<sub>3</sub>, CdTe, Ge, Si, SiO<sub>2</sub>, TiO<sub>2</sub>, ZnS, and ZnSe.

10     62. (New)      A solid state standard according to claim 58, wherein said first absorbent material  
11     is substantially similar to said third absorbent material.

13     63. (New)      A solid state standard according to claim 58, wherein said absorbent material has  
14     a known absorption wavelength.

16     64. (New)      A solid state standard according to claim 58, wherein said baking takes place at  
17     approximately at 250 degrees Centigrade.